

## Lesson Plan Outline

- I. Title: Litter and Ecology
- II. Objectives: Students will be able to *identify* litter in their community. They will be able to *categorize* the litter and *explain* its effect on the environment.
- III. Materials: Trash bags, scissors, markers, glue, tape, stapler, clean samples of litter, newspaper
- IV. Word List to pre-translate or teach in class:  
  
Litter  
Ecology  
Recycle / Recycling  
Biodegradable / Non-Biodegradable  
Environment
- V. Procedures:
  - A. Warm-up: How long does litter last?
    1. place specific objects of litter on the table.
    2. have slips of paper with times written on them that match length of time needed for each item to degrade in the environment (e.g. a tin can has a label of "250 years")
    3. students match the time labels with the pieces of litter (see end of lesson plan for a list of easily located objects and their degrading time)
  - B. New Material / Practice
    1. What is biodegradable? What is non-biodegradable?
      - a. Translate the words
      - b. Show examples (orange peels, sunflower seed shells, etc.)
    2. Students get in groups and take 5 minutes to write down in any language or how litter affects them. Use these writings for the next step.
  - C. Application
    1. Discuss the effects of litter on the environment using the student's writings.
      - a. It's ugly
      - b. It's depressing
      - c. It's dangerous (cigarette butts can burn, glass can cut, needles can hurt / infect)
    2. The environment is badly affected. Trash blows into rivers and lakes, is washed into it by rain. Water is polluted and blocked up
    3. Make litter art. "Found Art"
      - a. IMPORTANT NOTE: COLLECT A BAG OF CLEAN LITTER BEFORE DOING THIS ACTIVITY. If you have kids collect litter during the class, do not attempt to use it for "Found Art." It's gross and dirty and no one will touch it. You must have clean/"attractive" litter, trust me. [I sorted trash over a two week period prior to this lesson, saving colorful wrappers, packaging material, cardboard food boxes, water and soda bottles, labels, cigarette packets, phone cards, and other non-sticky, non-dirty pieces of trash.]
      - b. Students use the litter to make creative designs. Get the ball rolling by making one small piece of litter art (a flower out of foil wrappers for instance) and attaching it to one of the posters. It makes the explanation of what to do with litter and the poster paper much easier.

- c. Students cut and tear up the litter, then glue, tape, and staple it onto paper. Markers can be used to draw on the posters to supplement the litter.
- d. Hang them up on the school grounds (many schools have dedicated display board areas and teachers will help you get your posters put there)
- e. A slogan can be added to the piece of paper asking friends not to litter and it can become an advertisement. I used two posters, one in English and one in Russian. I divided the class of 20 into two groups of students who worked on the two posters, all sharing the same litter and office supplies. Slogans:
  - i. "Please Don't Litter!"
  - ii. "Пожалуйста Не Мусорить!" (Russian, please don't litter)

#### D. Summary

1. Note: The summary is best given DURING the litter art activity. The impact of doing the art with litter sends the message better than any "lecture."
2. What can students do?
  - a. Pick up trash
  - b. Use containers: walk a little and throw something away
  - c. Recycle program? Do you have one? Can you start one?
  - d. Education—teach your friends not to litter, too!
3. Back in the old days, people used to have a job picking up the trash. Not anymore! You have to do it yourself! *"You must BE the change you wish to see in the world."* - Mahatma Gandhi

#### E. Reserve Activities

1. This is one lesson where reserve activities are not usually necessary. The students will work on the litter art for as long as you let them, and there is never enough time.
2. However, if you have time and want to do a practical exercise, students can go outside on the school grounds and pick up litter there. Litter can be brought back to class and spread out on newspaper and a discussion can be had about the types of litter, what's recyclable, what's biodegradable, etc.

#### VI. How Long Does Litter Last?

- A. Paper, 2-4 weeks
- B. Cotton Rag, 1-5 months
- C. Rope, 3-14 months
- D. Wool Sock, 1 year
- E. Painted Stake, 13 years
- F. Tin Can, 100 years
- G. Aluminum Can, 200-500 years
- H. Plastic, 450 years
- I. Glass, ??? (unknown)



How long does litter last?

Как долго будет мусор?



# Biodegradable

Подверженный Биологическому  
Разложению

# Non-Biodegradable

Не Разлагаемый  
Микроорганизмами

